

fall examinations which occur in the months of September and October will be furnished on request after July 15. Those who desire to take the spring examinations for observer in the Weather Bureau should apply before April 15 to the Civil Service Commission for a copy of the general application blank, Form 304.

The Editor sees no reason why the public high schools and State colleges throughout the land should not make it their duty to teach enough science and modern languages to enable their graduates to pass these and the other examinations that are prescribed by the Civil Service before one can fill the higher positions in the Governmental service. The National Government has a right to look to those colleges, universities, and scientific schools *that have been founded or fostered by its benevolence* to provide the education needed by those who have to prosecute its work.

As a university is a collection of colleges and faculties under one general organization, so our national "University of the United States" must be nothing less than this collection of fifty or sixty State institutions that have directly or indirectly received aid from the National Government. If the intellectual and educational status of these so-called State institutions were to be submitted to the general oversight of the proper federal officer, in order to bring them all up to the required standard, as is now done with regard to the financial status of the Agricultural experiment stations, we should soon realize one of the ideals that so many have been looking for.

PROMOTION FOR MERIT.

That the Honorable the Secretary of Agriculture heartily approves of the efforts of the Chief of the Weather Bureau to maintain the service in a high state of efficiency is in no way more thoroughly shown than by his recent letter announcing that "preferment in this Bureau will be made only in recognition of merit and special fitness." The letter was printed in full for the use of Weather Bureau officials in Instructions No. 18 of 1898; but the following paragraphs seem worthy of reproduction in the MONTHLY WEATHER REVIEW:

Often the saving of hundreds of lives and the protection to millions of dollars' worth of property depend upon the alertness, scientific training, and executive ability of both subordinates and controlling officials of the Weather Bureau. When efficiently officered, this service is of such utility to the commerce and industry of the country that I wish it to be distinctly understood that preferment in this important Bureau of the Department of Agriculture will be made only in recognition of merit and special fitness. In this way, and in this way only, can the Department meet the demands that are made upon the weather service and maintain the high standard required of its officials. The Department is frequently annoyed and embarrassed by letters and petitions from extraneous sources, as in your case, which are inspired by employees seeking advancement to positions which they may not be qualified to fill or to which other employees of greater ability are more eligible.

The Chief of the Weather Bureau, having a complete record of the work performed by each employee therein, is better able to determine the fitness of officials for advancement and assignment than are those not familiar with the details of the service, no matter how much the latter may have the welfare of the public service at heart.

The annoying of United States Senators, Representatives, and other distinguished persons, or representative commercial bodies, with selfish importunities is to be deprecated, and will militate against the persons who may employ, encourage, or countenance such action. Officials of the Weather Bureau are expected to have the confidence and respect of prominent representative men in their localities, and it will at all times be pleasing to receive evidences of efficiency on the part of Weather Bureau officials and of the value of their service to the public; but such testimonials must not be the result of promptings or importunities of the employee interested.

You are an observer with a fair record in one of the minor grades. Were you to succeed in effecting your promotion to the grade of Section Director over the heads of many officials of higher rank and superior qualifications, the same line of procedure might in course of time be exercised to your personal detriment and some other official displace you by the same method. If you have merit, it will be

recognized in due course of time as the needs of the service render possible and as the comparative merits of your coworkers render practicable and just.

AN AMERICAN METEOROLOGICAL SOCIETY.

In order to advance the interests of any enterprise it is common to form an association and hold regular meetings for discussing the subject. Many societies, academies, and associations have thus contributed to the development of science, but it would be unfair to say that these have done more for science than has been done by individual efforts, or by the influence of universities and scientific schools. The formation of a voluntary association of individuals implies that there is a common need, and that the association can subserve the common interest. It would not be wise to add to the scientific organizations or to the scientific periodicals at present existing, unless there be a reasonable prospect of accomplishing something desirable that is not done by the existing institutions.

So far as concerns meteorology and climatology there are doubtless many features whose development can be especially furthered by local clubs, each of these to embrace the few persons who are especially interested in such matters, and can easily meet together or correspond with each other. Thus a club of three or four in any city or university could cooperate in investigating local clouds, auroras, thunderstorms, frost, hail, the vertical distribution of temperature, and numerous other local problems. A group of a half dozen or more stations within a few miles of each other could, by maintaining the most delicate self-recording apparatus, determine on the one hand the nature, origin, and movement of the sudden variations of the barometer and their connection with gusts of wind and falling rain, and on the other hand the relations in general between the wind directions and the isobars at that spot on the earth's surface. Pairs of observers, at high and low stations, could investigate the weight of the intermediate column of air and its relation to the observed pressures, temperatures, and moisture; two cloud observers, or photographers, and one kite flyer could, by preconcerted action, determine the altitude and details of the clouds and their relations to sunshine and the temperature and moisture of the layers of air in their neighborhood. The relation of local climate to any special crop is another matter of very special investigation, but the general laws that result therefrom must interest the whole scientific world. These little clubs of interested students represent narrow specialties, matters of which a general association may take cognizance, but to which it should not be confined.

If there is to be a general meteorological society it would be best to have its membership include all America, i. e., the United States and Canada, and as far as possible Mexico, the West Indies, and Central America, since every part of this great region is mutually interested in the weather and the climate of the other parts. Moreover, the storms, the northers, the cold waves, the hot waves, the rains, and the general peculiarities of the successive seasons can be properly studied only when we take cognizance of a very large region of atmosphere. But of course an association that covers so large an area can at the best have only an annual or triennial meeting; the interest of the members in each other's work and in the general progress of meteorology must, necessarily, be kept up by means of an efficient meteorological journal whose expenses must be wholly defrayed by the society. There are few, if any, scientific journals whose subscription lists defray anything more than a small portion of the expense, to say nothing of the salary of the editor. The percentage of self-sustaining journals is even less than the percentage of books that pay the authors an appreciable income, and yet we print books and sell them